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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/505,356	08/19/2004	Gerald J Julien	Ice US1	5987
7590 10/21/2010				
J. Michael Neary 53939 Pine Grove Road LaPine, OR 97739			EXAMINER WALTERS, JOHN DANIEL	
			ART UNIT 3618	PAPER NUMBER
			MAIL DATE 10/21/2010	DELIVERY MODE PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

### Office Action Summary

**Application No.**

10/505,356

**Applicant(s)**

JULIEN, GERALD J

**Examiner**

JOHN D. WALTERS

**Art Unit**

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 26 August 2010.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-4 and 6-21 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 6-12 is/are allowed.
- 6) ☒ Claim(s) 1-4 and 13-21 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 30 June 2006 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO/55/06)
- Paper No(s)/Mail Date 20100831, 20100908
- 4) ☐ Interview Summary (PTO-413)
- Paper No(s)/Mail Date \_\_\_\_\_
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: \_\_\_\_\_

### **DETAILED ACTION**

Claims 1 – 4 and 6 – 21 have been examined. Claim 5 has been canceled by Applicant.

#### ***Claim Objections***

Claim 21 is objected to because of the following informalities: claim 21 has the status identifier of (Currently Amended). Claim 21 is currently a newly introduced claim and should have been identified as (New). Please provide an appropriate identifier in subsequent claim submittals.

#### ***Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1 – 4 and 13 – 21 are rejected under 35 U.S.C. 103(a) as being unpatentable over Applicant's disclosure in view of Abkowitz et al. (6,318,738) and Julien (WO9729892). Applicant's disclosure states that the following physical structures are "...conventional and are well known to those skilled in the art":

- a blade body having an ice contacting bottom edge (Fig. 1, item 30);
- said blade body having a structure for engaging a blade holder (Fig. 2, item 34);
- said bottom edge having opposed corners that are sharpened (Fig. 3);

- said blade holder being connected to a boot (Fig. 1).

Abkowicz discloses titanium composite skate blades comprising:

- a titanium material blade, defined as any of the following: pure titanium, titanium alloys, or titanium matrix composites (column 2, lines 41 – 44);
- said material being free from reinforcement by any hardening constituent other than derivatives of the base skate material (Fig. 2 & column 2, lines 51 - 53)

It would have been obvious to one of ordinary skill in the art at the time of applicant's invention to combine the old and well known blade structure with the titanium material of Abkowicz in order to provide improved strength, corrosion resistance, wear resistance and reduced weight (column 1, lines 59 – 62).

Abkowicz does not specifically disclose the use of Type 60 Nitinol, however, Julien discloses a blade comprising:

- an inter-metallic compound of about 60% nickel and about 40% titanium by weight (abstract).

Applicant lists many standard physical properties for "Type 60 Nitinol" within claims 1 – 4 and 13 – 21. Each material selected would provide differing physical properties, as these properties are dependent upon the physical and chemical structure of each individual material. It would have been obvious to one of ordinary skill in the art at the time the instant invention was made to make use of the material of Julien with the old and well known skate blade made from a titanium material, as taught by Abkowicz, in order to provide corrosion resistance, hardness, toughness and flexibility, (page 2 of 17, paragraph 10).

***Allowable Subject Matter***

Claims 6 - 12 are allowed.

***Response to Arguments***

Applicant's arguments filed 26 August 2010 have been fully considered but they are not persuasive.

Applicant provides a long discussion on the Rule 132 Declaration provided by Susan Buchanan, President of Triumph Sport, Inc., licensee of the instant application. Abkowitz specifically and directly states that titanium alloys are appropriate materials for use in skate blades. This direct statement of applicability would lead one of ordinary skill in the art to consider and potentially pursue the use of a titanium alloy, such as one of the various formulations of Nitinol, in the construction of a skate blade. One cannot disregard the direct suggestion by Abkowitz to investigate the use of titanium and titanium alloys in the manufacture of skate blades. The Rule 132 Declaration contains no data, only the opinion of an interested party. Applicant also discusses matters that Ms. Buchanan "did not mention in her Declaration". As this was not part of the Declaration, it is not currently part of the record.

Applicant states, "The teaching in Abkowitz is use of an ice skate blade comprised of a titanium material "reinforced with a hard constituent.""

This is correct. Abkowitz alloys, i.e. combines in a homogenous mixture, Ti-6Al-4V with TiC particles. Figure 2 of Abkowitz shows a blade made from a solid composite material, as previously described. This is described as one embodiment of many and does not supersede the suggestion to look to other titanium based materials.

Appellant has provided a report commissioned by Triumph Sport, Inc. regarding a comparison between steel skate blades and Nitinol blades. Applicant states, "...since titanium skate blades are not available for test, that the Report is is (sic) good as can be had, and indeed the Report is especially relevant since steel skate blades are much superior to titanium blades and the report notes that Type 60 Nitinol blades are superior to the steel blades."

First, no data has been provided that steel skate blades are "much superior" to titanium skate blades. In fact, since Applicant has stated that titanium skate blades cannot be found for testing, it is unclear on what basis this assumption is based. If data is available to show steel blades being superior to titanium blades, said data could be included to show a direct comparison between titanium and Nitinol blades.

Second, the data contained within the report only makes a comparison between a standard skate blade and the instant invention. For such data to be applicable it would need to be a direct comparison of the claimed invention with the closest prior art (i.e. Abkowitz) which is commensurate in scope with the claims, the results must be due to the claimed features not to unclaimed features and the burden would be on the Applicant to establish that the results are in fact unexpected, unobvious and of statistical

and practical significance. Evidence for Nitinol blades in relation to steel blades has no bearing on the potential nonobviousness of titanium alloy blades in relation to Nitinol blades. Applicant is testing an invention disclosed in art not used in any rejection to attempt to disqualify an invention in art actually used in the rejection.

In Appellant's discussion of dependent claims 2, 3 and 14 - 20, no mention is made to the grounds of rejection listed above and in the prior rejections. Appellant repeatedly makes statements regarding what the Abkowitz and Julien references may or may not teach, but these references are not relied upon for the rejection of these claims. As stated above, Abkowitz is provide for the teaching of the use of a titanium containing material in skate blades and Julian is provided to show the existence of Type 60 Nitinol before the instant invention.

For this reason, the rejection stands.

### ***Conclusion***

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure:

- Buehler et al. (3,174,851) disclose nickel-base alloys;
- Sahatjian (4,909,510) discloses a ports racquet netting;
- Murai (4,952,044) discloses a metallic eyeglass frame and method for making the same;

- Wood (5,776,214) discloses a method for making abrasive grain and abrasive articles;
- Carpenter et al. (6,149,742) disclose a process for conditioning shape memory alloys;
- Johnson et al. (6,266,914) disclose spinner-type fishing lures and wire and cable fishing leaders.

Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than **SIX MONTHS** from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to **JOHN D. WALTERS** whose telephone number is



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(571)272-8269. The examiner can normally be reached on Monday - Friday, 8am - 5pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, J. Allen Shriver can be reached on (571) 272-6698. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/J. ALLEN SHRIVER II/  
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